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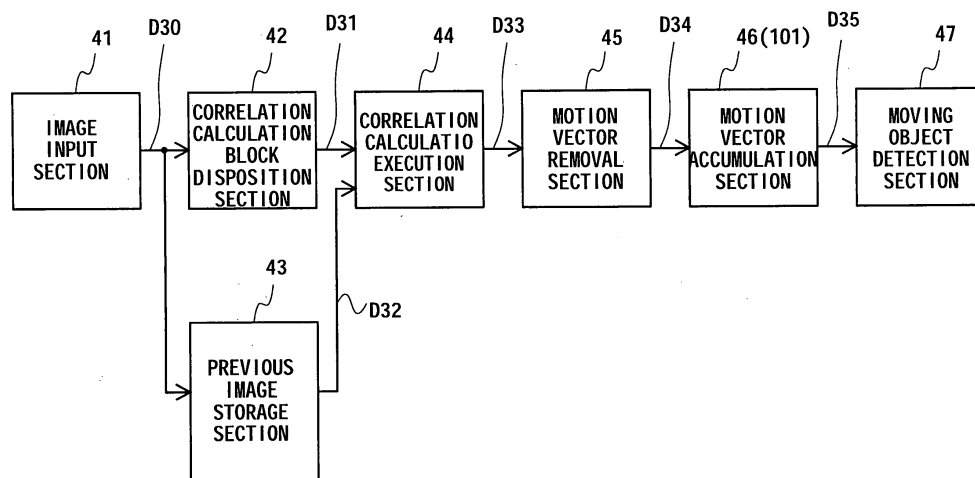
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(54) **Moving object detection apparatus, method and program**

(57) The present invention allows a moving object detection device to accurately detect moving objects.

The device includes: motion vector calculation means for calculating motion vectors from an input image; motion vector removal means for removing a motion vector having high randomness from the motion vectors calculated by the motion vector calculation means; motion vector accumulation means for temporally accumu-

lating each the motion vector not removed by the motion vector removal means, and calculating a accumulated number of times and accumulated value of each motion vector; and moving object detection means for determining, based on the accumulated value and accumulated number of each motion vector calculated by the motion vector accumulation means, whether or not each the motion vector corresponds to a moving object.



**40(100) MOVING OBJECT DETECTION DEVICE**

**FIG. 1**

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## EUROPEAN SEARCH REPORT

Application Number  
EP 06 00 5314

DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (IPC)
X	VETRO A ET AL: "Object-based coding for long-term archive of surveillance video", PROCEEDINGS OF THE 2003 INTERNATIONAL CONFERENCE ON MULTIMEDIA AND EXPO: 6 - 9 JULY 2003, BALTIMORE MARRIOTT WATERFRONT HOTEL, BALTIMORE, MARYLAND, USA, IEEE OPERATIONS CENTER, US, vol. 2, 6 July 2003 (2003-07-06), pages 417-420, XP010650665, ISBN: 978-0-7803-7965-7	1,14-16	INV. G06T7/20 G06K9/00
A	* abstract * * figure 2 *	2-13	
X	JIN-SUNG LEE ET AL: "Moving target tracking algorithm based on the confidence measure of motion vectors", PROCEEDINGS 2001 INTERNATIONAL CONFERENCE ON IMAGE PROCESSING. ICIP 2001 - THESSALONIKI, GREECE, OCT. 7 - 10, 2001; [INTERNATIONAL CONFERENCE ON IMAGE PROCESSING], INSTITUTE OF ELECTRICAL AND ELECTRONICS ENGINEERS, NEW YORK, NY, vol. 1, 7 October 2001 (2001-10-07), pages 369-372, XP010564873, DOI: 10.1109/ICIP.2001.959030, ISBN: 978-0-7803-6725-8	1,14-16	
A	* abstract * * figure 2 *	2-13	TECHNICAL FIELDS SEARCHED (IPC) G06K
A	HADA, T. AND MIYAKE, T.: "Tracking of a Moving Object with Occlusion by Using an Active Vision System", SYSTEMS AND COMPUTERS IN JAPAN, vol. 34, no. 13, 2003, pages 93-101, XP002666987, * abstract * * sections 2.1, 3.1 *	1-16	
The present search report has been drawn up for all claims			
Place of search Berlin		Date of completion of the search 12 January 2012	Examiner dos Santos, Luís
CATEGORY OF CITED DOCUMENTS X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document		T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document	

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